AMENDMENTS TO THE CLAIMS

This listing of the claims will replace all prior versions and listings of claims in the application:

Listing of Claims:

1. (Currently Amended) An authoring method for use in creating an audiovisual product, comprising the steps of:

defining a plurality of components, the components implicitly representing functional sections of audiovisual content with respect to one or more raw content objects, and a plurality of transitions that represent movements between the plurality of components wherein said one or more raw content objects comprises a source document or content and a plurality of navigational graphical entities, said plurality of components comprises a component representing a scrolling operation;

expanding the plurality of components and the plurality of transitions to provide a set of explicitly realised AV assets ~~(set of scrolling image data)~~ and an expanded intermediate data structure of nodes and links ~~(links to the set of scrolling image data and to images of each scrolling set – that is the video sequences within each set showing the scrolling)~~, wherein the set of explicitly realized ~~each node is associated with an~~ AV assets ~~of the set~~ comprises a plurality of animated scrolling video sequences and the links comprise navigation data to navigate between said plurality of animated scrolling sequences ~~represent movement from one node to another~~; and

creating an audiovisual product in a predetermined output format, using the AV assets and the expanded intermediate data structure of the nodes and the links, wherein the audiovisual product comprises data to produce, or at least emulate, scrolling image data.

2. (Original) The method of claim 1, wherein the defining step comprises defining at least one information component that comprises a reference to a raw content object.

3. (Original) The method of claim 2, wherein the reference denotes a file path to a location where the raw content object is stored.

4. (Previously Presented) The method of claim 1, wherein the defining step comprises defining at least one choice component comprising a reference to at least one raw content object, and at least one authoring parameter.

5. (Original) The method of claim 4, wherein the at least one authoring parameter is adapted to control a selection or modification of the at least one raw content object.

6. (Previously Presented) The method of claim 4, wherein the at least one authoring parameter comprises a runtime variable available during playback of the audiovisual product.

7. (Previously Presented) The method of claim 4, wherein the at least one authoring parameter comprises an authoring-only parameter that will not be available during playback of the audiovisual product.

8. (Previously Presented) The method of claims 4, wherein the choice component comprises a reference to a presentation template and a reference to at least one substitutable raw content object to be placed in the template according to the at least one authoring parameter.

9. (Previously Presented) The method of claim 1, wherein the defining step comprises defining at least one meta-component representing a set of components and transitions.

10. (Original) The method of claim 9, wherein the at least one meta-component is a procedurally defined representation of the set of components and transitions.

11. (Previously Presented) The method of claim 1, wherein each transition represents a permissible movement from one component to another component.

12. (Previously Presented) The method of claim 1, wherein each transition is associated with a triggering event.

13. (Original) The method of claim 12, wherein the triggering event is an event occurring during playback of the audiovisual product.

14. (Original) The method of claim 13, wherein the triggering event is receiving a user command, or expiry of a timer.

15. (Previously Presented) The method of claim 1, further comprising the step of checking expected conformance of the audiovisual product with the predetermined output format, using the plurality of components and the plurality of transitions.

16. (Original) The method of claim 15, wherein the predetermined output format is a hierarchical data structure having limitations on a number of objects that may exist in the data structure at each level of the hierarchy, and the checking step comprises predicting an expected number of objects at a level and comparing the expected number with the limitations of the hierarchical data structure.

17. (Previously Presented) The method of claim 15, wherein the checking step comprises predicting an expected total size of the audiovisual product, and comparing the expected total size against a storage capacity of a predetermined storage medium.

18. (Previously Presented) The method of claim 1, wherein the expanding step comprises, for each component, building one or more of the set of explicitly realised AV assets by reading and manipulating the one or more raw content objects.

19. (Previously Presented) The method of claim 18, wherein:

the defining step comprises defining at least one choice component comprising a reference to a plurality of raw content objects and at least one authoring parameter; and

the building step comprises:

selecting one or more raw content objects from amongst the plurality of raw content objects using the at least one authoring parameter; and

combining the selected raw content objects to form one of the AV assets.

20. (Original) The method of claim 19, comprising repeating the selecting and combining steps to automatically build a plurality of the explicitly realised AV assets from the one of the components.

21. (Previously Presented) The method of claim 1, wherein the expanding step comprises:

creating from each one of the plurality of components one or more explicitly realised AV assets to provide the set of AV assets;

creating the expanded intermediate data structure wherein each node represents one AV asset of the set; and

creating a set of links between the nodes.

22. (Previously Presented) The method of claim 1, wherein each transition is associated between first and second components, and creating the set of links comprises evaluating each transition to create one or more links, each of the links being between a node created from the first component and a node created from the second component.

23. (Previously Presented) The method of claim 1, wherein the expanding step comprises evaluating at least one of the transitions to create exit logic associated with at least one first node, evaluating one of the components to create entry logic associated with at least one second node, and providing a link between the first and second nodes according to the entry logic and the exit logic.

24. (Original) The method of claim 23, wherein at least one of the transitions is associated with a triggering event, and the expanding step comprises evaluating the triggering event to determine the exit logic associated with the at least first one node.

25. (Previously Presented) The method of claim 1, further comprising the step of checking expected conformance of the audiovisual product with the predetermined output format, using the AV assets and the expanded intermediate data structure of nodes and links.

26. (Original) The method of claim 25, wherein the predetermined output format is a hierarchical data structure having limitations on a number of objects that may exist in the data structure at each level of the hierarchy, and the checking step comprises predicting an expected number of objects at a level and comparing the expected number with the limitations of the hierarchical data structure.

27. (Original) The method of claim 26, wherein the checking step comprises predicting an expected total size of the audiovisual product, and comparing the expected total size against a storage capacity of a predetermined storage medium.

28. (Currently Amended) The method of ~~any preceding~~ claim 1, wherein the AV assets have a data format specified according to the predetermined output format.

29. (Previously Presented) The method of claim 1, wherein the AV assets each have a data format according to the predetermined output format, whilst the raw content objects are not limited to a data format of the predetermined output format.

30. (Previously Presented) The method of claim 1, wherein the predetermined output format is a DVD-video specification.

31. (Previously Presented) The method of claim 1, wherein the AV assets each comprise a video object, zero or more audio objects, and zero or more sub-picture objects.

32. (Previously Presented) The method of claim 1, wherein the AV assets each comprise at least one video object, zero to eight audio objects, and zero to thirty-two sub-picture objects, according to the DVD-video specification.

33. (Previously Presented) The method of claim 1, wherein the creating step comprises creating objects in a hierarchical data structure defined by the predetermined output format with objects at levels of the data structure, according to the intermediate data structure of nodes and links, and where the objects in the hierarchical data structure include objects derived from the explicitly realised AV assets.

34. (Previously Presented) The method of claim 1, wherein the predetermined output format is a DVD-video specification and the creating step comprises creating DVD-video structure locations from the nodes of the expanded intermediate data structure, placing the explicitly realised AV assets at the created structure locations, and substituting the links of the expanded intermediate data structure with explicit references to the DVD-video structure locations.

35. (Currently Amended) An authoring method for use in creating a DVD-video product, comprising the steps of:

creating a plurality of components representing parameterized sections of audiovisual content with respect to one or more raw content objects, and a plurality of transitions

representing movements between components, wherein said one or more raw content objects comprises a source document or content and a plurality of navigational graphical entities, and said plurality of components comprises a component representing a scrolling operation;

expanding the plurality of components and the plurality of transitions to provide a set of AV assets and an expanded data structure of nodes and links, where each node is associated with an AV asset of the set and the links represent movement from one node to another, wherein the set of AV assets comprises a plurality of animated scrolling video sequences and the links comprise navigation data to navigate between said plurality of animated scrolling sequences; and

creating a DVD-video format data structure from the AV assets, using the nodes and links, wherein the DVD-video format data structure comprises data arranged to produce, or at least emulate, scrolling image data.

36. (Previously Presented) The method of claim 35, further comprising creating at least one information component comprising a reference to an item of AV content.

37. (Previously Presented) The method of claim 35, further comprising creating at least one choice component comprising a reference to at least one item of AV content, and at least one parameter for modifying the item of AV content.

38. (Original) The method of claim 37, wherein the choice component comprises a reference to a presentation template and a reference to at least one item of substitutable content to be placed in the template according to the at least one parameter.

39. (Previously Presented) The method of claim 37, wherein the choice component comprises at least one runtime variable available during playback of an audiovisual product in a DVD player, and at least one authoring parameter not available during playback.

40. (Previously Presented) The method of claim 35, further comprising creating at least one meta-component representing a set of components and transitions.

41. (Previously Presented) The method of claim 35, wherein each transition represents a permissible movement from one component to another component, each transition being associated with a triggering event.

42. (Original) The method of claim 41, wherein a triggering event includes receiving a user command, or expiry of a timer.

43. (Previously Presented) The method of claims 35, wherein the expanding step comprises:

creating from each one of the plurality of components one or more AV assets to provide the set of AV assets;

creating the expanded data structure wherein each node represents one AV asset of the set; and

creating a set of links between the nodes.

44. (Previously Presented) The method of claim 37, wherein the expanding step comprises evaluating each choice component to create a plurality of AV assets according to each value of the at least one parameter.

45. (Original) The method of claim 44, wherein evaluating each choice component comprises creating entry logic associated with at least one node and/or evaluating at least one transition to create exit logic associated with at least one node, and providing a link between a pair of nodes according to the entry logic and the exit logic.

46. (Previously Presented) The method of claim 35, further comprising the step of checking expected conformance with the DVD-video format using the created components and transitions.

47. (Previously Presented) The method of claim 35, further comprising the step of checking expected conformance with the DVD-video format using the set of AV assets and the expanded data structure of nodes and links.

48. (Previously Presented) An authoring method for use in creating an audiovisual product according to a DVD-video specification, comprising the steps of:

generating a set of AV assets each comprising a video object, zero or more audio objects and zero or more sub-picture objects, and an expanded data structure of nodes and links, where each node is associated with one AV asset of the set and the links represent navigational movement from one node to another; and

creating a DVD-video format data structure from the set of AV assets, using the nodes and links;

the method further characterized by the steps of:

creating a plurality of components and a plurality of transitions, where a component implicitly defines a plurality of AV assets by referring to a presentation template and to items of raw content substitutable in the presentation template, and the plurality of transitions represent navigational movements between components; and

expanding the plurality of components and the plurality of transitions to generate the set of AV assets and the expanded data structure of nodes and links, wherein the set of AV assets and the expanded data structure comprises data for producing, or at least emulating, scrolling image data.

49. (Previously Presented) A method as claimed in claim 48, further comprising the step of:

producing, from data representing a static visual asset, a set of visual assets in which each visual asset of the set comprises data unique to that asset and data common to that asset and at least one other visual asset of the set; each visual asset of the set having respective defined dimensions.

50. (Original) A method as claimed in claim 49, in which the step of producing the set of visual assets comprises the step of:

progressively traversing the static visual assets to copy data, from the static visual asset, to form respective visual assets of the set.

51. (Original) A method as claimed in claim 50 in which the step of traversing comprises the step of:

defining a predeterminable step size, less than at least one of the respective defined dimensions, and traversing the static visual asset according to that predeterminable step size.

52. (Previously Presented) A method as claimed of claim 49, further comprising the steps of:

creating, for each visual asset in the set, associated asset display control data comprising data representing at least one selectable graphical element and at least one link, associated with the selectable graphical element, to another visual asset of the set of visual assets.

53. (Original) A data processing method as claimed in claim 52, in which the step of creating comprises the step of:

creating, for selected or all visual assets of the set of visual assets, associated asset display control data comprising data representing at least a pair of selectable graphical elements and data representing at least a pair of links, associated with respective ones of the pair of selectable graphical elements, to a preceding visual asset and a succeeding visual asset of the set of visual assets.

54. (Previously Presented) A method as claimed in claim 49 in which at least one of the dimensions of the static visual asset exceeds at least one of the defined dimensions of at least one of the visual assets of the set of visual assets.

55. (Original) A method as claimed in claim 54, in which the dimensions of the static visual asset exceed two defined dimensions of at least one of the visual assets of the set of visual assets.

56. (Previously Presented) A method as claimed in claim 49 in which the step of producing the set of visual assets comprises the step of:

progressively traversing, in at least two different directions, the static visual asset to copydata, from the static visual asset, to form respective visual assets of the set.

57. (Original) A data processing method as claimed in any claim 56 in which the step of producing the set of visual assets comprises the step of:

progressively traversing, in at least two orthogonal directions, the static visual asset to copy data, from the static visual asset, to form respective visual assets of the set.

Claims 58-78. (Canceled).